

Behavioral Health Care Delivery Models and Examples: Contractual to Functional Integration

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Contents

Executive summary	1
Introduction	3
Conceptual frameworks of integration	7
Pincus' framework of mental and general health linkage.	7
Models of contractual linkage	9
Models of functional linkage	11
Models of educational linkage.	12
Summary of conceptual frameworks	13
Models of contractual relationships	15
State contract experiences.	15
Summary of public sector examples.	20
Private sector experience	21
Models of functional relationships	25
Examples of functional models.	29
State experience	30
Large private employers	31
Private health insurance plans.	33
KP-Colorado	38
KP-Georgia	38
KP Northeast Division-Massachusetts	38
KP-North Carolina	39
KP-Washington/Idaho	39
KP-Oregon/Washington	40
KP-Northern California	40
KP-Southern California	40
Group Health Cooperative (GHC)	41
Group Health Cooperative/US West Company.	41
Aetna, Inc.	41
BCBS/Raytheon	42

Allina Health System (AHS)	43
Foundation Health Systems, Inc..	43
Choicehealth	43
Summary of health insurance plans	44
Community and other programs	44
Integrated Healthcare Partners (IHP)/KPS.	44
Assertive Community Treatment (ACT).	45
Religious institutions	46
Summary of community and other programs	47
Models of educational linkages	49
Overview	49
Examples of educational/training programs	49
Great Britain	49
United States	50
Netherlands	51
Other educational models (medical school, psychiatry program, and nursing)	52
Medical school education	52
Psychiatry program	52
Nurse education model.	53
Summary	53
How does the Navy compare to current practices?	55
Planning issues.	57
Contractual considerations	57
Functional considerations	57
Conclusion	63
Appendix A: State use of contractual models	65
Appendix B: State use of managed care organizations	67
References	69
List of figures	77
List of tables	79
Distribution list	81

Executive summary

How should the Navy organize its health care system to deliver behavioral and mental health services? To help Navy Medicine answer this question, we highlight findings from the literature on the experiences of various entities that have implemented integrated delivery models of behavioral health care. We find that three types of delivery models tend to dominate the U.S. health care system: contractual models, functional models, and educational models. Within each type of model, a major point of debate focuses on the question of whether to carve out (i.e. separate) or to integrate mental health with primary care. Carve-out approaches separate the organization and delivery of mental and behavioral health services from primary care. However, what integration means depends on the model type.

Contractual models describe the structural organization supporting the provision of health care. Contracting arrangements represent formal agreements between different types of providers regarding patient and information flow. Functional models describe clinical approaches to care and focus on the physician-patient-specialist relationship. Integrated functional models are an emerging approach to care that uses interdisciplinary provider teams to treat patients with behavioral and mental health conditions in the primary care setting. Educational models add a graduate medical education element to functional approaches.

Currently, the use of contractual carve-outs and functionally autonomous clinical relationships tend to characterize common practice in the delivery of mental and behavioral health care in the United States. However, a growing number of entities are experimenting with functionally and educationally integrated approaches to care. Initial results of such experiments indicate a potential for increasing patient access and satisfaction to care as well as achieving improved patient outcomes. Based on our review of the literature, we recommend that Navy Medicine develop and implement a pilot program that clinically

integrates mental health with primary care in at least one of its outpatient primary care clinics to determine the extent to which integration may help the Navy optimize the provision of its mental health services.

Introduction

Navy Medicine has identified mental and behavioral health as one of the major product line areas for which it wants to develop a strategy for providing these specialty services. To inform this strategy development process, we provide a review of the mental health care delivery models that dominate the U.S. health care delivery system, assess where the Navy stands in comparison to current delivery trends, and outline salient issues regarding potential changes that the Navy should consider as part of its managed care evolution.

We focus on three types of delivery models: contractual, functional, and educational. *Contractual* models tend to define the structural organization supporting the provision of health care, providing formal agreements between different types of providers regarding patient and information flow. In the mental health arena, carve-outs have emerged during the past 20 years as the dominant contractual approach to managing mental and behavioral health care. Purchasers turned to carve-outs as a means to manage care and contain mental health care costs. *Functional* models describe clinical approaches to care and tend to focus on the physician-patient-specialist relationship. The provision (or integration) of mental health treatment in the primary care setting represents an emerging approach to care that uses interdisciplinary clinical teams in the primary care setting to treat patients who present with mental and behavioral health conditions. *Educational* models focus on the training of primary care physicians and mental health specialists, within both the initial and continuing graduate medical education processes. In current practice, however, carve-outs and autonomous service delivery are more common.

The ongoing debate of whether to carve out or integrate mental health with primary care has been fostered by the accumulating evidence of the prevalence of mental health diagnoses in the population

and of the challenges people face in obtaining access to care, dual and proper diagnosis, and appropriate treatment. About one in five adults in the U.S. experience a mental disorder in the course of a year and roughly 15 percent of all adults who have a mental disorder in one year also experience a co-occurring substance use disorder [1].

Depression is most commonly seen in primary care settings [2, 3] with at least 50 percent of mental health patients receiving exclusive treatment from their primary care provider [4, 5, 6]. Cognitive behavioral therapy and interpersonal psychotherapy have proved effective in primary care settings [7], as have the use of antidepressant pharmacology and time-limited, depression-targeted psychotherapies [8]. However, primary care providers often fail to recognize psychiatric disorders [4]. The known result is that persons experiencing mental illness are less able to function than those with other chronic medical conditions, especially when they remain undiagnosed and untreated [6]. As a result of these findings, efforts focused on expanding the provision of mental health care in the primary care setting have received much attention in the literature. It is believed that managed care in mental health expands access to care, uses limited resources more responsibly, and decreases unnecessary services [9]. Based on the growing evidence, the National Institute of Mental Health (NIMH) and others argue that mental health care is a U.S. health problem that cannot be addressed by specialists alone—hence, the need for collaboration with primary care [2, 3, 6, 10, 11, 12, 13].

What approach should the Navy take to ensure that its beneficiaries have access to care, effective proper diagnosis, and treatment for mental and behavioral health problems? In this paper, we identify the predominant models of mental and behavioral health care in terms of specific delivery system designs and the manner in which mental health services are either carved out from or integrated with primary care. We summarize findings in the literature on the experiences of various entities that have implemented programs of care under each of the different models and compare these experiences with respect to both contractual characteristics (such as structure, financing scheme, and program approach) and functional characteristics (such as access, use, quality, clinical practice patterns, and business practices). Finally, we contrast the current mental/behavioral health

delivery approach of the military health care system with the various models and identify key decisions that Navy Medicine will have to make in determining which approach to follow in developing its product line strategy.

The literature citations covered in this review are derived primarily from the Medline database, which covers biomedicine, allied health fields, the biological and physical sciences, humanities, and information science. Medline has an index of information, dated 1966 to present, from approximately 3,600 journals and books worldwide. Also used were the Ovid Technologies database (the largest full text journal database worldwide), databases of selected full text references (LEXIS®-NEXIS® Academic Universe, Congressional Universe, and Statistical Universe), Ebsco Publishing journal and book database, and three Internet search engines (Infoseek, Alta Vista, and Google). We supplemented this with information collected via correspondence with several health system experts [14, 15, 16, 17, 18, 19].

Conceptual frameworks of integration

Efforts promoting “collaboration” between general and mental health follow three main types of models: contractual, functional, and educational. Contractual models describe the program management designs that focus on the administrative and structured care relationships underlying the business mechanics of a health care plan. Common applications are mental health carve-outs and integrated health plans. Functional models address the clinical interaction between primary care physicians and mental health specialists in providing care. This may follow one of three common paradigms: the traditional autonomous/independent model, the consultative/collaborative model, or the integrated joint care model. Educational models focus on the ways in which providers are trained, specifically in terms of cross-training between specialties. In this section, we describe and compare three classes of conceptual frameworks that focus on the contractual and functional links between mental and general health based on the works of Pincus [20], Schulberg et al. [21], and the Substance Abuse and Mental Health Services Administration (SAMHSA) [22].

Pincus’ framework of mental and general health linkage

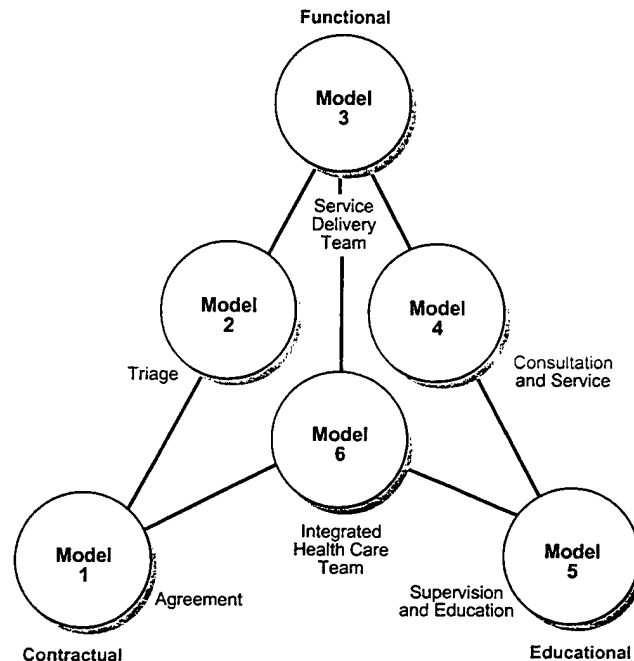
Harold Pincus [20] was one of the first to develop a conceptual framework that models the link between the mental health and general (physical) health systems (see also [23, 24]). These models lie along a three-dimensional continuum focusing on contractual, functional, and/or educational elements. The contractual element addresses the content of formal and informal agreements between the mental health and the general health settings. It includes such factors as the mechanism of patient referral, method of transferring information, access to patient records, patient follow-up, transportation arrangements, billing procedures, planning, programming, development, and operations. The functional element encompasses the patient-provider relationship and includes such factors as diagnostic evaluation, substance abuse treatment, and other modes of

treatment. The last area of focus, the educational element, deals with the ongoing education and skill development of both primary care physicians and mental health specialists. In figure 1, we provide a reproduction of Pincus' conceptual models of linkage between general health and mental health systems of care. The models are:

- *Model 1. Agreement*—the emphasis of this model is on contractual elements, where there is a formal and informal agreement on patient referral, followup, and information transfer.
- *Model 2. Triage*—although similar to the first model, agreement is more specific and articulated. There is a designated person who provides assessment and triage and also eases the process of referral, information flow, and followup.
- *Model 3. Service delivery team*—the general health setting (under its own auspices) establishes a clearly defined mental health organization unit. The basic function is to provide assessment and some treatment.
- *Model 4. Consultation and service*—there is an emphasis on providing provider-provider consultation to improve the specialty capabilities of the primary care provider. If specialty care is required, the mental health specialist is used.
- *Model 5. Supervision and education*—the emphasis is on education, providing non-mental-health professionals skills to assess, treat, and manage patients with emotional problems.
- *Model 6. Integrated health care team*—mental health providers are integrated into the day-to-day functioning of a primary health care team. This is a synthesis of models 1, 3, and 5.

Pincus' framework provides a categorization of the kinds of interactions that are possible between general and mental health, with different areas of emphasis. The contractual, functional, and educational aspects represent more comprehensively the current literature and practice. Models 2, 4, and 6 of Pincus' framework lie along a three-dimensional continuum and relate to models 1, 3, and 5. In this paper, we provide more detailed information on current applications of the contractual, functional, and educational elements of behavioral health care delivery.

Figure 1. Pincus' models of linkage between general health and mental health systems of care^a



a. Source [20].

Models of contractual linkage

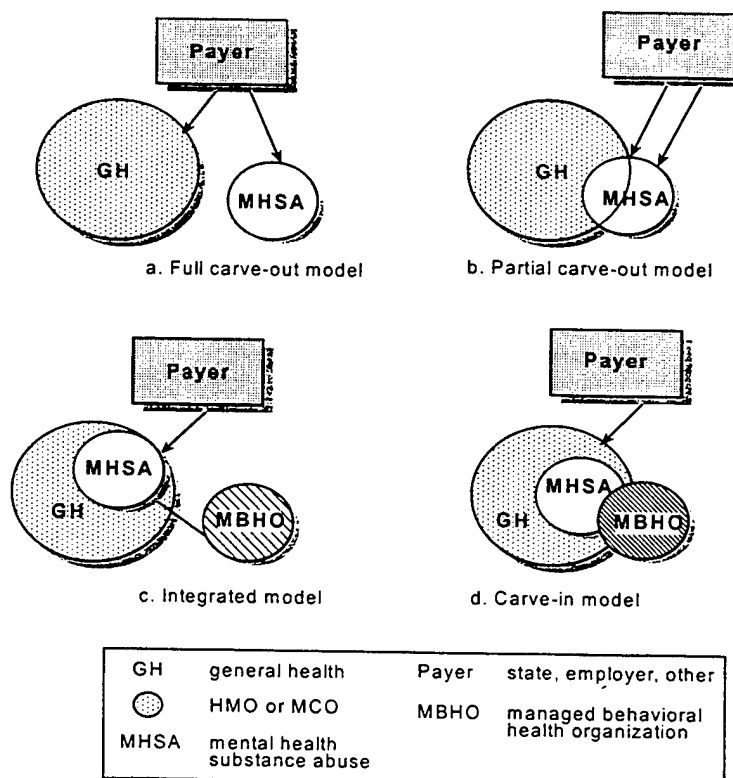
In figure 2, we highlight five types of interaction that represent the contractual spectrum of the mental health/general health relationship [22]. Note that these model types are not exhaustive or mutually exclusive because designs and structures have overlapping features. The contractual models are:

- *Full carve-out, or stand alone (figure 2a).* Purchasers completely separate general health managed care programs from mental health and/or substance abuse services. This is also referred to as primary carve-out or payer's carve-out.
- *Partial carve-out (figure 2b).* A partial carve-out is a separate managed care program that delivers expanded mental health/substance abuse (MHSA) services to special populations (e.g., children with serious emotional disturbance, adults with severe mental illness) beyond the basic benefit plan. The basic benefit

plan does include some MHSA services. Some plans use partial carve-out as supplements to integrated designs.

- *Integrated (figure 2c).* A general health managed care program includes mental health and substance abuse services. The managed care contract is usually with a managed care organization, such as a health maintenance organization (HMO) or managed care organization (MCO). They operate these integrated programs but may also subcontract with a behavioral health specialty organization to deliver MHSA services within the comprehensive plan. This is called “checkbook” integration because the purchaser of the plan makes a single payment, even though MHSA services may be subcontracted.
- *Carve-in (figure 2d).* In this approach, the purchaser requires the behavioral health organization to have a clinical relationship with the primary managed care entity or have reimbursement/special requirements for HMOs delivering MHSA services.

Figure 2. Contractual models of linkage between general and mental health delivery systems from least (a) to most integrated (d)



The models just described address mainly organizational and financial dimensions, "rarely engineering a specific clinical strategy to effect integration at the patient and practitioner level" [25]. Purchasers, practitioners, and researchers tend to confuse integrated benefits management under contractual arrangements with care management that clinically integrates health and mental health services on the functional level. We will clarify this in the next section.

Models of functional linkage

Much of the discussion on mental health integration alludes to mental health clinical services. Contractual models tend to reflect a preoccupation among managers and policy-makers who focus on program design, structure, and costs. These models portray how the mental health system is managed vis-à-vis the general health system. However, they capture only part of the total picture and do not address the functional health care component. The functional (i.e., clinical) aspect of care illuminates the patient-clinician relationship and the nature of the interaction between the primary care physician and the mental health specialist (model 3 of Pincus' framework, figure 1). The functional models (see figure 3) that tend to dominate current studies that explore clinical element of service delivery are as follows:

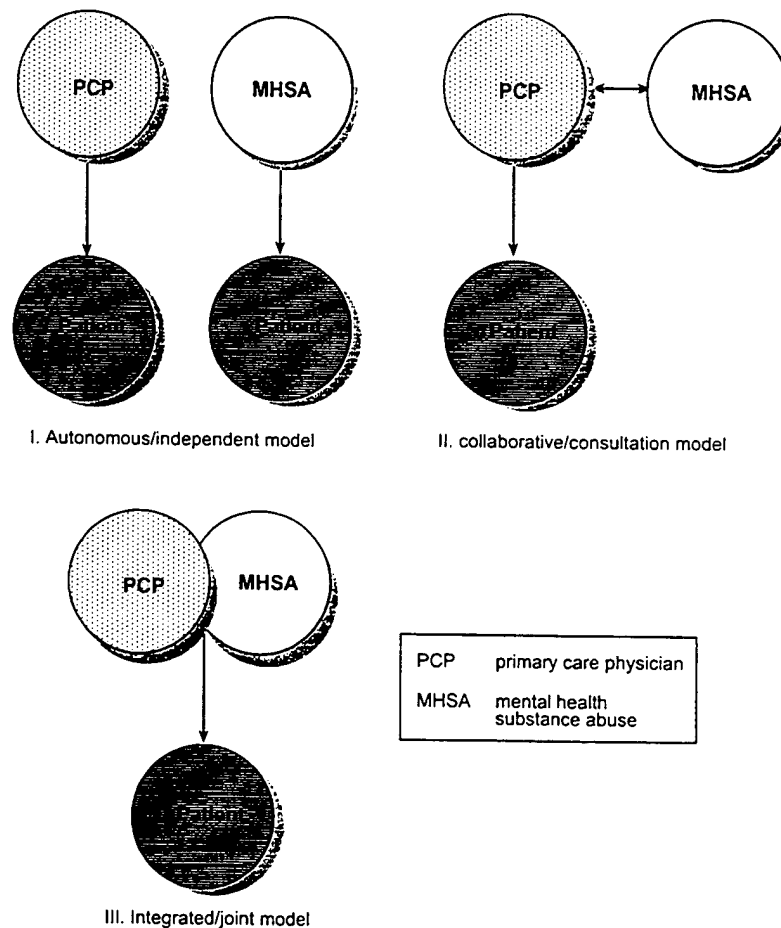
1. The autonomous or independent or model. In this model, there is little interaction between the primary care clinician and the mental health/substance abuse specialist. A referral can be made by the primary care physician, but there is no assurance of followup or coordination by the mental health specialist.

2. Consultation or collaborative model. In this model, the primary care physician is the principal provider, and the behavioral health specialist serves as a consultant in terms of treatment. This model also is known as the parallel model.

3. The integrated or joint care model. In this final model, the primary care clinician treats patients together with mental health specialists. They are considered a health delivery team, and mental health specialists also meet with patients, discuss their records, evaluate,

diagnose, and advise the general physician. The integrated model allows for optimizing opportunities for learning and the exchange of information between primary care physicians and mental health specialists [22, 24, 26, 27].

Figure 3. Functional models of linkage between the primary care physician and MHSA specialist



Models of educational linkage

In addition to the contractual and functional elements of Pincus' linkage model, the educational interaction between the PCP and mental health specialist is also pertinent. The necessity of behavioral health education within the primary care setting is underscored by

Pincus [20], Frazier [24], Schuyler and Davis [28], and Ratcliffe et al. [29]. Supervision and education place emphasis on providing non-mental health professionals skills to assess, treat, and manage patients with behavioral health problems. The ongoing medical education of providers includes both PCPs and mental health providers with an emphasis on general health issues that are relevant to treating the “whole” patient [24]. Continuing medical education programs in psychiatry for non-psychiatric physicians, physician group training, and programs in undergraduate and graduate medical education are all examples of the educational elements of the primary care mental health linkage.

Summary of conceptual frameworks

The contractual, functional, and educational models provide a useful conceptual framework for examining mental health care delivery. The most commonly applied contractual models are carve-outs and integrated delivery systems. The most commonly referenced functional models are the autonomous and integrated/joint care models. Educational applications tend to focus on the use of graduate medical education training programs to foster communication and sharing of knowledge between primary care physicians and mental health specialists.

In the sections that follow, we review the current state of mental health care delivery in the United States. We begin with a look at current patterns in the use of contractual agreements addressing mental health care using examples from state public sector programs, private employers, and health insurance plans. The experiences of the 50 states are particularly relevant to DOD because they rely heavily on contractual models in their role as a major purchaser of mental health services under both state general assistance and Medicaid programs. Second, we examine current patterns in the use of functional arrangements for providing mental health care at the clinic level. Again, we present a selection of examples from the states, private employers, health insurance plans, and community programs. Finally, we provide an overview of several programs that attempt to integrate the training of primary care providers and mental health specialists.

Models of contractual relationships

State contract experiences

In 1996, public payers covered nearly 53 percent (\$37 billion) of total mental health expenditures in the United States [1]. Within the public sector, the 50 states represent one of the major purchasers of mental health services in the United States via their funding contributions to Medicaid and other state and local mental health programs, such as state mental health authorities (SMHAs) and the state alcohol and other drug (AOD) agencies. During the past two decades, state funding of mental health services has been shifting slowly from direct support of state and local government programs to a greater reliance on Medicaid, under which states receive matching federal funds. A consequence of this shift is that state Medicaid program designs have taken on the role of policy pioneer in shaping the delivery of mental health care, specifically with regard to contractual arrangements having a managed care approach and aimed at cost containment.

Managed care as applied to the mental and behavioral health setting encompasses a variety of strategies focused on controlling costs while ensuring access to appropriate levels (use) of quality care.¹ Behavioral health managed care methods include the formation of preferred provider networks, gate-keeping (or pre-certification), case management, relapse prevention, retrospective review, and claims payment [30]. State mental health programs may provide coverage on a state-wide basis or limit coverage to certain geographic areas, such as counties. In addition, some programs provide coverage of mental health services to all eligible beneficiaries, whereas others target certain sub-populations, such as children. Key characteristics include the type of

1. Unless otherwise noted, our primary source of information for this section is a recent study sponsored by SAMHSA [22].

model used, reliance on private or public sector organizations as source of care, contractor type, and payment schemes.

During the last 3 years, the number of states implementing behavioral health managed care programs increased from only 14 to 42 (including the District of Columbia), whereas two states (Montana and North Carolina) reverted from managed care arrangements to fee-for-service plans. As of 1999, 30 states have adopted 41 integrated programs, 29 states have adopted a total of 35 carve-out programs (including stand-alones), and 3 states are using partial carve-outs.² A number of states have more than one type of managed behavioral health care program; therefore, representation is not mutually exclusive among these three approaches (i.e., the sum of the number of states reported in several categories may be greater than 50 because of overlap in characteristics of programs).

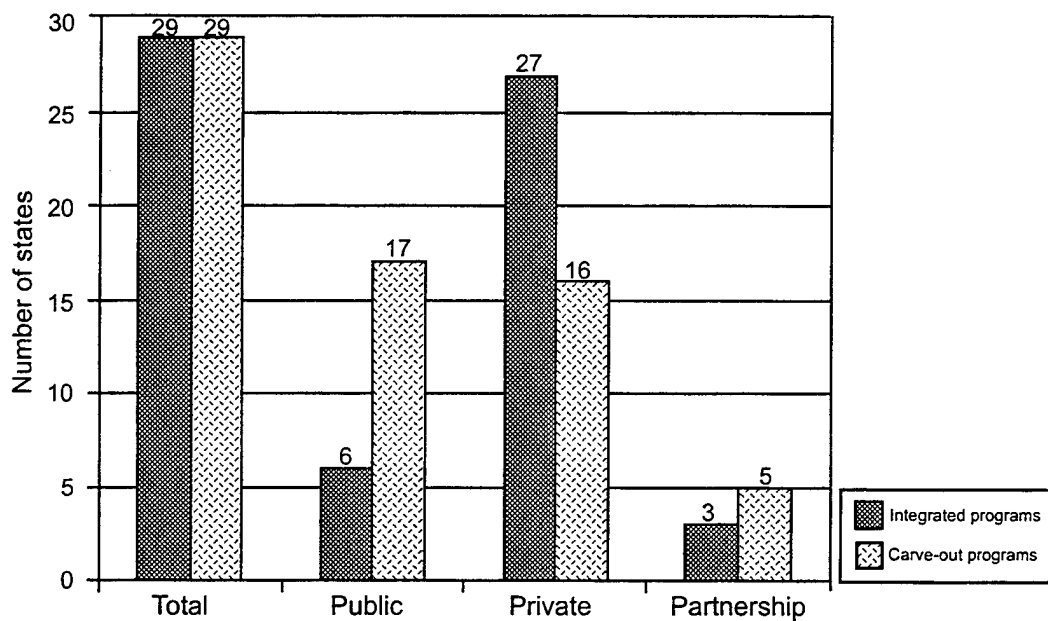
The range of services covered under state mental-health-specific carve-outs tends to include more specialized care, such as residential treatment, rehabilitation, community support, and consumer-run services. State integrated programs tend to cover pharmaceutical expenses and to manage/coordinate pharmacy use with primary care. A similar pattern occurs under substance-abuse-specific programs. Carve-outs tend to cover detoxification, residential treatment, opiate/methadone treatment, crisis/emergency care, and preventive services. Integrated substance-abuse-specific contracts tend to cover inpatient and outpatient care and a lesser range of specialized services.

While state Medicaid agencies are a major purchaser of managed behavioral health care services, state mental health and substance abuse authorities also work with their respective state Medicaid agencies, particularly in the use of carve-outs. Among states with integrated contracting programs, Medicaid agencies serve as the purchaser in 93 percent of the states. In contrast, among states with carved-out programs, Medicaid is the purchaser for 69 percent of the states.

2. We provide a detailed breakout identifying the specific approach adopted by each state in appendix A.

In figure 4, we show the number of states with either carve-out or integrated programs (or both) by the type of entity with which they enter into contractual arrangements for mental health services. Contracting organizations include public providers, private providers, or some combination/partnership of the two. Figure 4 indicates that states using an integrated approach tend to contract with private sector entities; those using carve-outs tend to prefer public sector organizations. A smaller number participate in joint ventures (or partnerships) between public and private organizations. (See appendix B for detailed state data.)

Figure 4. The number of states^a with managed care programs, by contract type and approach type, 1999

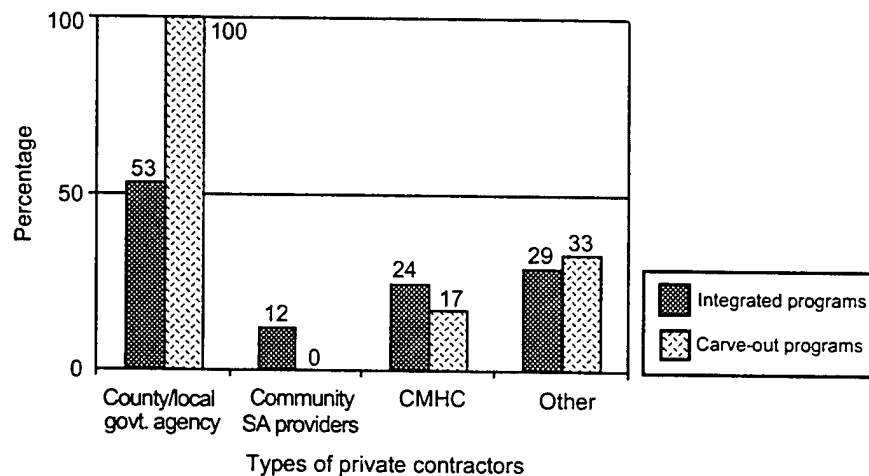


a. States sum to more than 50 because of multiple programs in each state. Source: [22].

Public sector contractors are mostly county or local government agencies, community mental health centers, and community substance abuse providers. Private sector organizations include HMOs, behavioral HMOs (BHMOs), or individual providers. Among states using public contractors, all six state integrated programs contract

with county/local government organizations, as did a majority of the states using carve-outs (see figures 5 and 6). Among those using contractors in the private sector, states with integrated programs tend to contract with HMOs; states with carved-out programs prefer BHMOs.³ Overall, the private sector has a greater presence among integrated state programs compared to carve-outs. Not only is there a distinguished association between type of program approach (integrated/carve-out) and type of purchaser, but there also appears to be a relationship among type of program approach and type of contractor (namely, public vs. private).

Figure 5. Types of public managed care organizations for public sector managed behavioral health care programs, 1999

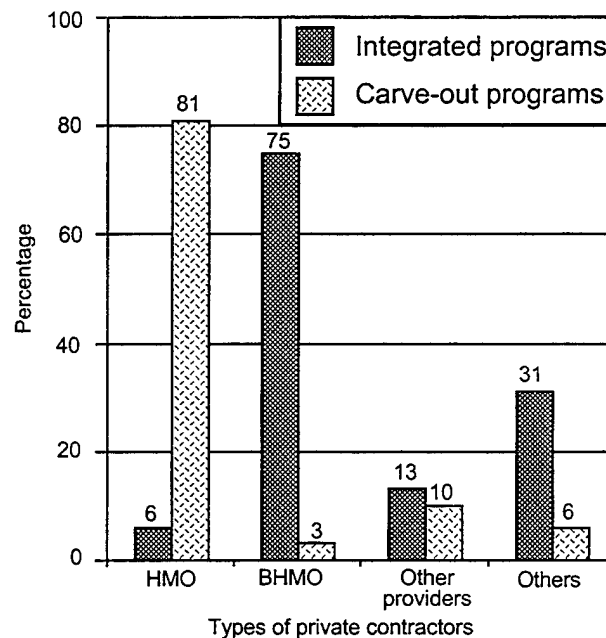


A majority of the states (90 percent of those using managed care, n = 38) negotiate full-service contracts under which the contracting organization agrees to provide both administrative and clinical services for the state's managed care program. Full-service contracts usually include an element of risk in which the contractor agrees to assume at least some portion of the financial risks associated with care provided and paid for under the program. A smaller percentage of states

3. Percentages do not sum to 100 because many states have more than one program.

(24 percent, n = 10) use an administrative service only (ASO) contract. Under an ASO contract, states contract with an independent organization that is responsible for supplying administrative services, such as claims processing and treatment authorization. The organization is paid a fee for its services and assumes no financial risk. Finally, five states employ other forms of managed care financing agreements, including primary care case management and managed fee-for-service.⁴

Figure 6. Types of private managed care organizations for public sector managed behavioral health care programs, 1999



4. *Primary care case management* is a managed care option in which enrollees pick a primary care provider who serves a gatekeeper role (must authorize services before reimbursement for care is approved). The primary care provider receives a per capita management fee and payment for services provided. *Managed fee-for-service* plans combine managed care techniques with the traditional fee-for-service payment system. Managed care tools used include precertification, second surgical opinion, and utilization review.

In terms of payment strategies, states use a variety of approaches ranging from full-risk, capitated payments to fee-for-service payment schedules. As shown in table 1, the most common payment arrangement, for states contracting with a managed care organization, is on a capitated basis (37 states), followed by fixed fees (12 states), and fee-for-service (10 states). The most common payment arrangement for states contracting with providers is fee-for-service: 34 states compared to 10 among managed care organizations.

Table 1. Risk and payment methods for managed care organizations and providers for state Medicaid and non-Medicaid managed behavioral health programs, 1999

Risk and payment method	Number of states	
	Arrangement between states and managed care organizations	Arrangement between states and providers
Full capitation	37	27
Partial capitation	2	6
Global budget	4	5
Fixed fees	12	18
Fee-for-service	10	34
Case rate	—	17
Other	5 ^a	3 ^b

a. Includes bundled rate, performance contracting, and case rates.

b. Includes programs in which the provider payment varies by HMO or geographic region.

Summary of public sector examples

For the most part, state contracting practice predominantly follows either the carve-out or integration model. In terms of state experience using “integration” contracts, only one model is currently used for integrating health and mental health services: Medicaid purchases management of a single benefit package that includes mental health, through a single premium, from a single primary contractor or health plan—thus assuming that singularity equals integration. Although HMOs usually manage state mental health programs under integrated contracts, most carve out any behavioral health benefits they manage. In almost no case does that commercial health plan deliver the mental health benefit through a truly integrated approach; in most cases, the plan carves it out [25].

Private sector experience

As noted earlier, funding for mental health services comes from both public and private sources. We also noted in the previous section that approximately 53 percent (\$37 billion) of total U.S. mental health expenditures in 1996 came from public payers, including the Medicare and Medicaid programs, as well as other federal, state, and local programs. The remaining 47 percent (\$32 billion) of total U.S. mental health expenditures in 1996 came from private sources, with nearly \$18 billion from private insurance [1].⁵ In comparative terms, private insurance mental health expenditures represented only 27 percent of total U.S. mental health expenditures in 1996. In this section, we provide recent information on the use of contractual carve-outs among employer-based insurance coverage plans in the United States. Our data sources for this section are the published data from the Kaiser/Health Research and Educational Trust survey of employer-sponsored health benefits for 1999 and 2000 [31, 32].

In figure 7, we show the percentage of covered workers in plans that carve out mental health benefits by plan type. From 1998 through 2000, about one-fifth of all covered workers are in plans that use carve-outs for providing mental health benefits. During the period, carve-outs are most common among preferred provider organizations (PPOs) and point-of-service (POS) plans. They are less common among conventional plans and HMOs. In terms of regional differences in 1999, employees in the West were more likely to have employer-based insurance plans that carved-out their mental health benefits, whereas the use of carve-outs was the least common among firms in the South (see table 2). In addition, employees covered under conventional plans in the South and West had a significantly lower chance of being covered by a plan using mental health carve-outs. Employees working for jumbo firms were more likely to be covered by a plan using mental health carve-outs than employees in smaller firms. Mental health carve-outs were most prevalent among

5. The remaining U.S. mental health expenditures in 1996 predominantly represent out-of-pocket payments, which include copayments from people with private insurance, payments for uncovered services, and direct payments from either the insured or uninsured [see 1].

POS plans, again particularly for jumbo firms. Overall, compared to recent state program trends, private sector plans appear to rely much less on the use of mental health carve-outs.

Figure 7. Percentage of covered workers in firms that carve out mental health benefits by plan type, 1998-2000

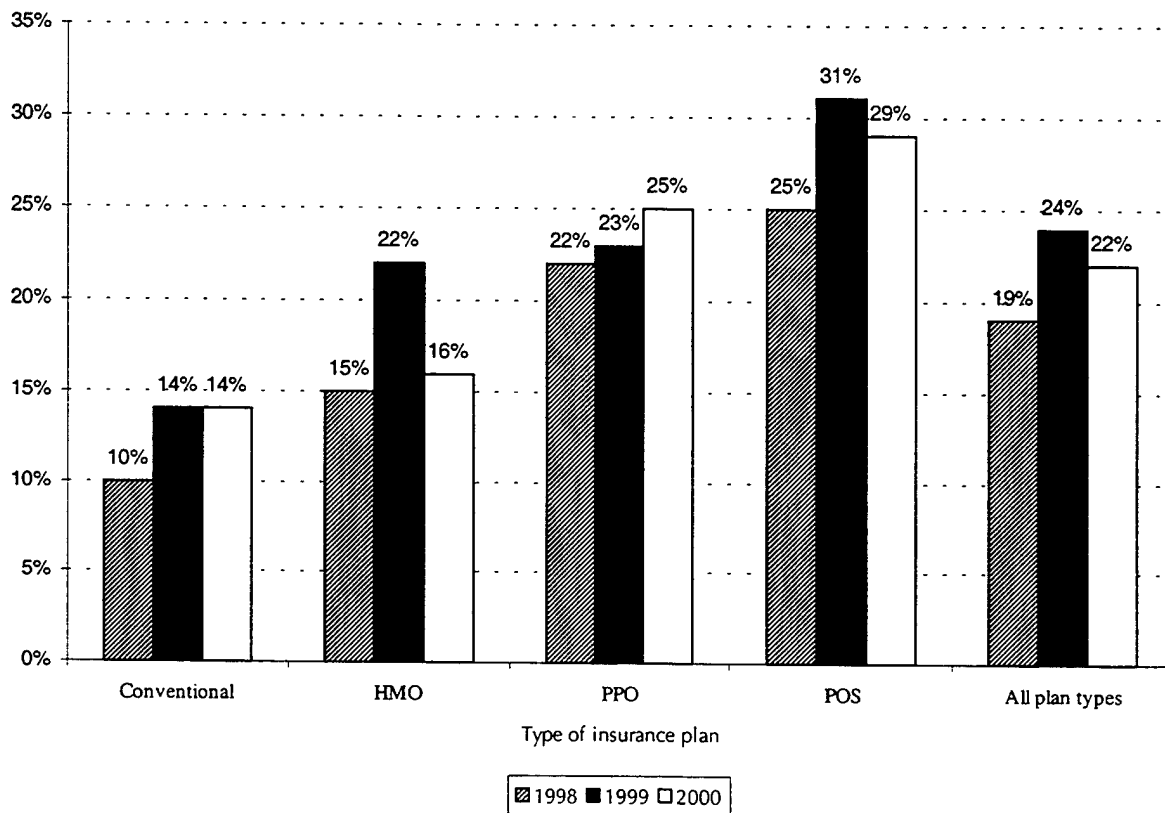


Table 2. Percentages of covered workers in firms that carve out their mental health benefits, by region and firm size, 1999

	Conventional	HMO	PPO	POS	All plan types
Region					
Northwest	21	13	18	26	20
Midwest	16	16	27	25	23
South	8*	17	14	27	17
West	15*	40	50	57	45
Firm size					
Small (3-199 workers)	17	13	15	14	14
Midsize 9200-999 workers)	11	11	30	14	21
Large (1,000-4999 workers)	10	15	15	12	14
Jumbo (5,000+ workers)	16*	31	29	52	35
All regions and firm sizes	14*	22	23	31	24

* Estimate is statistically different from All Plan Types within a plan type.

Source: [31]

Models of functional relationships

Whereas contractual models demonstrate structural approaches to behavioral health care delivery from the management perspective, functional applications illustrate specific ways in which behavioral health is provided in the clinical setting. In this section, we provide examples of functional applications and examine the nature of the interactions between patient and practitioner, and between the primary care provider and mental health specialist. We present a brief synopsis of each example of the various functional models that are currently operating in the public and the private sector.

As shown in figure 3, the functional models representing clinical interactions between practitioners are the autonomous, collaborative, and integrated models. The autonomous approach is simply the traditional practice in which mental health specialists independently provide behavioral health services. In regard to the operating definitions of collaborative care and integrated care, misinterpretation and misuse are common. Collaborative care between the primary care provider (PCP) and mental health specialist (MHS) does not necessarily mean integrated, nor is "communication" among providers even "coordinated." Strosahl [33] helps to clarify this by providing a list of distinguishing differences between collaborative and integrated care from several different "dimensions." Table 3 is an adapted version of his definitions. The primary provider in a collaborative care setting would either be the PCP or psychiatric therapist working in coordination with the PCP; in integrated care delivery, the primary provider is a team consisting of the PCP and mental health specialist working side by side. Note the differences under the patient's perspective, location, and team identification dimensions in table 3. The patient does not perceive that he/she is receiving a separate service. Integrated care is not necessarily one of co-location (e.g., in another wing, on a different floor, or an adjacent building) but where providers are at the same medical practice area/office.

Table 3. Distinguishing characteristics of integrated and collaborative models

Dimension	Collaborative care	Integrated care
Main provider	PCP or therapist	PCP and therapist
Mission	Provide specialty mental health care while keeping health care providers "in the loop"	Provide a primary care service addressing behavioral health issues
Location	In separate location or co-located in "mental health wing"	In medical practice area
Service modality	Therapy session	Consultation session
Team identification	"One of them"	"One of us"
Referral statement	"Go see a specialist I work with in the mental health wing"	"Go see one of our primary care team members who helps out with these kind of issues"
Philosophy of care	Behavioral health is a specialty service done outside the context of routine health care	Behavioral health is part of the process of general health care
Patient's perspective	Receive a separate service from a specialist who is in close collaboration with a health care provider	Looks like, feels like a routine aspect of care

Source: [33]

Primary mental health services follow a continuum of care that is based on the complexity of the health problem and the percentage of the primary care population that will use the service (table 4). The behavioral health-consultation makes up the bulk of the visits (60 percent) and is the foundation of integrated primary care. The visit interval, 15-30 minutes, matches the pace of primary care. The integrated care level is for high-frequency and/or high-cost primary care populations. The treatments are highly condensed and specialized to correspond with the fast work pace in the primary care. The co-management of patients by PCP and mental health consultant allow for higher volume. The specialty consultation level handles patients with chronic mental health problems and/or physical problems. These are managed in the primary care setting and require a longer

period of time to treat. Service is consultative in nature; visits are brief (15-30 minutes), infrequent, and predictable over time.

Table 4. Levels of primary mental health care

Level of care	Percentage of primary care populations	Key service characteristics
Behavioral health consultation	60	Brief, general in focus; oriented on a specific referral issue from health care provider. Designed to enhance effectiveness of psychosocial and medication interventions by health care provider. Exclusively consultative in nature.
Integrated care programs	30	Usually focused on high-cost and/or high-frequency conditions. Employs temporary co-management approach; ultimate goal is to return care in toto to health care provider. Program structure is manualized, with condensed treatment strategies; emphasis is on patient education and self-management strategies.
Specialty consultation	10	Reserved for high-utilizers and multi-problem patients. Emphasis is on containing excessive medical utilization, giving providers effective behavioral management strategies and community resource case management. Goal is to maximize daily functioning of patient, not necessarily symptom elimination.

Source: [33]

Examples of functional models

The best way to understand the linkage between PCPs and mental health clinicians is to examine current applications. We have many examples of independent models because they are the traditional methods of mental health care delivery. There are fewer examples of collaborative approaches and even fewer of integrated models. Although integrated behavioral health care is still new territory, sufficient examples are operating across the country to provide a picture of different experiences. Health insurance plans, large employers, and various organizations have developed and implemented pilot/demonstration programs to integrate services. We have compiled a list of current examples from the civilian sector (table 5). The first group described is state plans, followed by a group of private employers that offer generous mental health care benefits. Next, we describe health insurance plans that operate with private employers or in conjunction with the states. Last, we present several progressive models that work closely with community organizations/leadership.

Table 5. Examples of functional relationship models

	Autonomous/ independent	Collaborative/ consultative	Integrated/joint
<u>State experience</u>			
Massachusetts	x		
Oregon	x		
New Mexico		x	
<u>Private employers</u>			
AT&T	x		
Kodak	x		
General Motors		x	
American Airlines	x		
Delta Airlines	x		
<u>Health insurance/plans</u>			

Table 5. Examples of functional relationship models (continued)

	Autonomous/ independent	Collaborative/ consultative	Integrated/joint
Kaiser Permanente (KP)- Colorado region			x
KP-Georgia region			x
KP-North Carolina region			x
KP-Massachusetts region			x
KP Group Health NW Washington/ Idaho regions			x
KP Group Health NW Oregon/ Washington regions			x
KP - Northern California			x
KP - Southern California		x	
Group Health Cooperative of Puget Sound			x
Aetna US Healthcare	x		
BCBS/Raytheon of MA			x
Allina Health System			x
Foundation Health Systems, Inc.	x		
Choicehealth	x		
Group Health Cooperative /US West Company		x	
<u>Community and other programs</u>			
Integrated healthcare partners (IHP)			x
Assertive Community Treatment (ACT)			x
Religious institutions		x	

State experience

Only three states—Massachusetts, New Mexico, and Oregon—finance statewide, mandatory, close-to-comprehensive, and “integrated” programs for all Medicaid beneficiaries. New Mexico requires HMOs to “partner” with providers experienced with delivering behavioral health services, such as a Behavioral Health Managed Care Organization (BHMCO); Massachusetts and Oregon contract with both integrated and carve-out plans. Although these states are considered integrated, it is by contractual terms only. They are not entirely

functionally integrated (at the clinic level) but are the three states that have the most potential in moving toward clinical integration.

The Massachusetts Division of Medical Assistance (DMA) recently included program standards in its HMO contracts and assigned management for this part of the HMO contract to Medicaid's Behavioral Health Unit [22]. They are only beginning to collect data to analyze the HMOs' provision of behavioral health care. DMA also recently issued a request to seek input on a potential model for integrated management of both the behavioral health carve-out and a primary care provider network. In the meantime, DMA required that all plans develop a communication protocol for informing PCPs of a member's hospitalization, discharge plan, and medication regimen. Massachusetts is also developing consensus guidelines for the treatment of depression in primary care settings.

The Oregon statewide health plan that began in 1994 treated mental illness treatment equitably with general medical conditions. The plan has a prioritized⁶ list of covered conditions with mental health care capitation. The state's role has changed from directly managing mental health services to being primarily a purchaser, setting up contracts with MCOs. The behavioral health benefit is separate from general health.

Currently, only New Mexico has any kind of "collaboration" among providers. It is the sole state with a contractual carve-in plan in which HMOs are required to identify and partner with providers that are experienced with providing behavioral health services [22].

Large private employers

Almost all large employers cover MHSA services; however, not many offer parity [35]. Most of the seven employers' health plans we examine operate under a referral system in which mental health specialists operate independently. These employers, which we selected based on available information and on their generous health plans of near parity, have systems and requirements for pre-approval of treatment as conditions for their network benefit, as well as provisions for triage and assessment, using such systems as case managers, diagnostic and

6. For more information on case weighting, see [34].

referral agencies, and employee education programs (EAP) [36]. Employers recognize the prevalence of co-occurring substance abuse and mental illness. Thus, they have made provisions for referral from the initial treating entity—for example, from an inpatient detoxification treatment center to a mental health provider. In the case of co-occurring mental illness and substance abuse, employers made efforts to establish procedures to provide for a “hand-off” from an initial or primary treatment provider to a specialist. None, however, use integrated treatment programs as part of their health plans.

Employers noted frequent problems with coordination between primary care physicians and the managed behavioral health providers. Some of the coordination-of-care issues are the result of employee confidentiality concerns barring information sharing. AT&T stated that primary care physicians sometimes do not recognize symptoms of depression or other mental illness or substance abuse [35]. Also they claim that, when PCPs do recognize such symptoms, the prescribed treatment is not consistent with AHCPR guidelines. Kodak described concerns about the quality and clinical appropriateness of psycho-pharmacotherapy when provided by PCPs rather than mental health or substance abuse professionals [35].

To ensure that referrals are appropriate, American Airlines and General Motors do not make the list of network providers available to employees. They require involvement of their care referral professionals. Similarly, Delta Airlines requires a face-to-face assessment and care treatment plan provided by its central diagnostic and referral agencies before admission for inpatient care. Under Kodak's referral system, employees must call the mental health network to receive referrals to providers within a geographic area. Kodak uses its EAP professionals to coordinate treatment for employees with substance abuse disorders. Once substance abuse inpatient treatment is completed, the employee is referred for mental health treatment [36].

People often do not access services or use network providers because of the stigma attached to mental illness and substance abuse [36]. Employers continue to encourage employees to use needed services through employee education programs, such as depression screening. Private employers agree that there are still significant barriers to

achieving quality mental health and substance abuse care, most notably stigma, lack of coordination of treatment with primary care, the need to ensure that people with addictions receive followup and aftercare treatment, and the need to address co-occurring mental and addiction disorders. Some health plans have addressed these issues by stationing behavioral health case managers in primary care clinics to provide ongoing consultation on diagnosis of mental illness and substance abuse, as well as appropriate pharmacological treatment. In summary, private employers' mental health plans are characterized by autonomous delivery of care with the exception of GM offering a kind of "consultative" care.

Private health insurance plans

Two health insurance plans, Kaiser Permanente (KP) and Group Health Cooperative of Puget Sound, have made great strides in their attempts to integrate clinical services in behavioral health [14]. KP (Kaiser Foundation Health Plan, Inc.) is a not-for-profit health maintenance organization, serving 8 million members in California, Colorado, Georgia, Hawaii, Kansas, Maryland, Missouri, Ohio, Oregon, Virginia, Washington, and the District of Columbia [37]. KP is currently studying the effects and benefits of integration via a pilot program called the Integrated Care Program [14]. KP's principles of integrating mental health, chemical dependency, and primary care focused on case finding, communication, specialized program, education, and data systems [31, 38]. The following is a description of KP's activity in integrating clinical services by states or regions [14].

Table 6 is a compilation of examples of functional integration approaches detailing collaboration focus areas, staffing/location issues, time/duties of mental health specialists, and preliminary results of these integration projects.

Table 6. Examples of collaboration approaches of functional integration, among selected private health insurance plans

Health insurance/ plans	Collaboration focus areas	Staffing/location	Time/duties	Preliminary results
Kaiser Permanente (KP)- Colorado region, The Integrated Care Program	Case finding Communication Specialized program Education Data systems	Two mental health clinicians placed in Family Practice and Internal Medicine Departments	MH specialists spend 30% with medical staff and 70% on direct care Mental health clinicians meet each week with medical staff and the department head to discuss patients and medication	Increased provider satisfaction Increased patient satisfaction Decreased depressive and anxiety symptoms
KP- Georgia region	Case finding Communication Specialized program Education Data systems	Behavioral health clinician on the Primary Care Ser- vices Health Care Team	Team work Joint lead of PCP and MH specialists in discussion groups Identify problems Provide ongoing education Act as consultant Facilitate referrals to MHSA programs Improve patient's adherence to treatment regimens Manage difficult patients Provide direct treatment	Analysis stage
KP- Massachusetts region	Case finding Communication Specialized program Education Data systems	Behavioral Health Care Services delivery system include health center based staff (co-location) and an affiliated network	Behavioral health clinicians serve in adjunct positions along with PCP to care for patient panels (Health Care Team)	More appropriate utilization Improved health status

Table 6. Examples of collaboration approaches of functional integration, among selected private health insurance plans (continued)

Health insurance/ plans	Collaboration focus areas	Staffing/location	Time/duties	Preliminary results
KP- North Carolina region	Case finding Communication Specialized program Education Data systems	Two areas have behavioral health staff A therapist spends two days a week at each of the two satel- lite Primary Care offices. In another region, a therapist and psychologist are perma- nently based at the Medical office	MH specialists provide consultation to PCPs of the Primary Care Team and provide mental health department services	Analysis stage
KP Group Health NW Washington/Idaho regions	Case finding Communication Specialized program Education Data systems	Combined staff (co-location) and network delivery	In six of seven centers there are behavioral health specialists serving as direct liaison to medical staff. They can also see patients without the presence of PCPs. Make referrals	Increased quality Increased efficiency
KP Group Health NW Oregon/Washington regions	Integrated electronic infor- mation systems Staff based delivery models Mind phone consul tation line Case finding Communication Specialized program Education	Behavioral health teams placed in multiple full service primary care offices Chemical dependency staff placed at three largest community hospitals	A pilot program integrating MH clinicians into two primary care modules at one clinic- with a third of the time spent on consultation	Analysis stage

Table 6. Examples of collaboration approaches of functional integration, among selected private health insurance plans (continued)

Health insurance/ plans	Collaboration focus areas	Staffing/location	Time/duties	Preliminary results
KP – Northern California Psychiatry Model of Care	Communication Access Case finding Quality programs Education ^a Regional call centers Computerized clinical information systems Team effort	Co-location Adult primary care team program	Joint team work Conduct evaluations and brief interventions with patients Encourage and assist PCPs	Increased case detection Increased quality Increase provider satisfaction Increased patient satisfaction Better communication between providers
KP – Southern California	Case finding Communication Specialized program Education Data systems	Undetermined	Telephone collaboration, teleconferencing, and ongoing dialogue	Analysis stage
Group Health Cooperative /US West Company	Enhancing consultation services Address high utilizers Communication between employer and caregiver	Undetermined	BH clinician serves as liaison between Primary care clinic and US West Company	Expect to decrease the number of high utilizers and reduce employee absentees

Table 6. Examples of collaboration approaches of functional integration, among selected private health insurance plans (continued)

Health insurance/ plans	Collaboration focus areas	Staffing/location	Time/duties	Preliminary results
BCBS/Raytheon of MA	“Carved-in” proactive integrated approach Integrate wellness and prevention Disease management Training staff	Co-location of medical and behavioral health professionals	Team work, joint consultations, collaborate, ensure coordination and communication through joint case management	Year one 1996 Results: 50 cases were co-managed with medical and behavioral health triage/assessment Expecting: improvement in efficiency and assurance of appropriate care Reduction of ER visits Improved quality for seriously ill patients
Allina Health System	Integrated health system Multi-specialty Site based Access	Full time Ph.D. psychologist placed at clinics Other places have doctoral and master level therapists	Direct consultations with patients Consultation Collegial stimulation and support	Meets patient’s needs Case mix changed to serve more seriously ill Small personnel turnover Expecting cost effectiveness

a. KP Northern California implemented an educational program in their integration project that exceeded their expectations, with high patient satisfaction responses. A practice guidelines team was set up to establish parameters of behavioral health education classes. Classes are designed to teach patients and family members. The program linked the health education department and the department of psychiatry. The departments of psychiatry hired at least a half-time behavioral health education coordinator for the Behavioral Health Education program. The coordinator, along with the team, designs the curriculum based on regionally developed guidelines. [39]

KP-Colorado

A pilot program in Colorado called Integrated Care Program places two mental health clinicians into the Family Practice and Internal Medicine Departments. These mental health clinicians meet each week with the medical staff and the department head to discuss patients, medication, and collaboration issues. They spend 30 percent of their time with medical staff and the rest of the time on direct patient care. After 3 months of this pilot study, medical staff and patients indicated satisfaction with the program. Patients also had a clinically significant decrease in depressive and anxiety symptoms.

KP-Georgia

One of the aims in the Georgia region is to include a behavioral health/chemical dependency clinician on the Health Care Team, which is called the Primary Care Services Health Care Team. The mental health clinician's role is to assist the primary care physician with the following activities:

- Identify behavioral/chemical dependency problems.
- Provide ongoing education.
- Act as consultant.
- Facilitate referrals to MHSA programs.
- Improve patient's adherence to treatment regimens.
- Manage difficult patients.
- Provide direct treatment.

KP-Georgia also developed an Integration Committee and a brochure to be distributed to patients on the Behavioral Health Services within Primary Care Services. It is developing a pilot project to have mental health specialists and primary care physicians jointly lead group visits for high-use patients.

KP Northeast Division-Massachusetts

The current Northeast Division consists of staff from the former Northeast Permanente Medical Behavioral Group and the Community Health Plan in Massachusetts. Health-center-based staff and an

“affiliated network” of behavioral health clinicians make up the Behavioral Health Care Services delivery system in the KP–Massachusetts region. Affiliates may be in private individual or group practice.

Behavioral health care clinicians serve, in adjunct positions, along with primary care physicians to care for patient panels, known as the Health Care Team. Some behavioral health care clinicians are located in the primary care setting to work with this Health Care Team. The Personal Health Improvement Program (PHIP) is managed by both primary care clinicians and behavioral health clinicians. PHIP serves patients who display somatic symptoms and have chronic physical illness. Positive results have been indicated: improved health status and more appropriate utilization.

KP–North Carolina

In two of its market areas, the Carolina Permanente Medical Group has placed behavioral health staff in its Primary Care offices. A therapist works at two satellite Primary Care Offices two days a week each in the Central Carolinas market. In the Triangle market region, a psychiatrist and therapist are based at a Medical Office. They have been working with primary care clinicians for 2 years providing Mental Health Department Services and consultation to the Primary Care Team. They have applied for funding from the KP Depression in Primary Care Project to conduct depression screenings for patients who have cardiac disease and diabetes.

KP–Washington/Idaho

This Group Health Northwest division serves southern, central, and eastern Washington and Idaho using a combined staff and network delivery model. In six of the seven health centers, a behavioral health specialist works as direct liaison to the primary care physician. These specialists carry pagers and can be called on by primary care physicians to see patients in the examination rooms. The primary care physician may or may not be present. Behavioral health specialists can make a referral to and a patient's appointment with the Behavioral Health Services Department. They believe that this integration is “useful, and promotes quality of care and efficiency.”

KP–Oregon/Washington

The integration of Behavioral Mental Health and Primary Care Services in this region includes the following:

- Placement of behavioral health teams at multiple full-service primary care office sites
- Development of consultation services by chemical dependency staff at the three largest community hospitals
- Introduction of integrated electronic information systems
- Staff-based delivery models
- A “mind phone”—a consultation line for patients to ask questions of a psychiatrist, even at the primary care office
- A pilot program integrating mental health clinicians into two primary care modules at one clinic—a third of their time is spent on consultation.

KP–Northern California

In 1992 a project called the Psychiatry Model of Care (PMOC) was developed to integrate mental health and primary care. The Adult Primary Care team responsible for mental health care was to include physicians, nurse practitioners, medical assistants, nurses, a manager, a behavioral health specialist, a health educator, and a physical therapist. This multidisciplinary group works jointly in the same place and is the core of the program [31].

KP–Southern California

The southern California region of Kaiser Permanente serves 2.5 million members from San Diego to Bakersfield. It operates a collaborative style of integration in delivering mental health services. This includes telephone collaboration, teleconferencing, and ongoing dialogue for exchange of information between primary care providers and mental health specialists. The collaborative process is still in development [40].

Group Health Cooperative (GHC)

Group Health Cooperative of Puget Sound is a not-for-profit managed health care group serving more than 30 counties in Washington and 5 counties in Idaho. The organization is owned by its nearly 700,000 members [41]. Members may participate in HMO, PPO, or point-of-service health plans. Group Health Cooperative has allied with Virginia Mason Medical Center to share medical centers and hospitals. The Behavioral Health Services coordinates all mental health services and chemical dependency care for Group Health patients. Simon and VonKorff [12] discussed a study by GHC that found positive results with an integrated program. Strosahl [33] and Johnson et al. [42] have also cited GHC as a sound model for drawing lessons on integration. Their Program for Depression Care is aimed at enhancing behavioral health consultation services onsite in the primary care clinic to assist primary care physicians.

Group Health Cooperative/US West Company

Cooperative and US West Company is an example of a collaborative/consultation model. US West is a telecommunications company that offers health benefits through GHC. The company operates in 14 states from the upper Midwest through the Rocky Mountain region to the Pacific Northwest. They have made efforts to build a collaborative model linking primary care and mental health specialists to address high users of behavioral health care. A behavioral health clinician serves as liaison between US West and the primary care clinic [42].

Aetna, Inc.

Aetna follows an autonomous delivery model. The company provides group and individual health care products through Aetna US Healthcare [43]. In most areas, certain behavioral health care services (e.g., treatment or care for mental disease or illness, alcohol abuse and/or substance abuse) are managed by an independently contracted organization. This organization makes initial coverage determinations and coordinates referrals; any behavioral health care referrals will usually be made to providers affiliated with the organization, unless patient needs for covered services extend beyond the capability of these providers. As an Aetna US Healthcare HMO, Quality Point of

Service (QPOS), or USAccess plan member, to receive maximum benefits, northern California members must consult their PCP before accessing care (for plan benefits) by using a list of network providers. The PCP will refer the member to the appropriate provider associated with his/her PMG or IPA. Magellan Behavioral Health provides mental health benefits for Aetna US Healthcare HMO and QPOS⁷ members in Massachusetts, without the need for members to attain a referral from their PCP.

BCBS/Raytheon

The Blue Cross and Blue Shield (BCBS) Association coordinates more than 45 chapters that provide health insurance to almost 75 million Americans through HMOs, preferred provider organizations, point-of-service plans, and fee-for-service plans. To compete with managed care employers that can reject poor insurance risks, Blues are merging within the national alliance, creating for-profit units, forming joint ventures with for-profit providers, or dropping their not-for-profit status and going public [44].

Mental health care is “carved in” with general health care, making wellness and prevention integrated in BCBS plans [45]. Their concept of integration involves co-location of medical and behavioral health professionals working on the same team. The goals of the team are to collaborate, strategize with patient and providers, hold joint physician/psychiatry consultations, ensure multidisciplinary team communication and coordinate services through joint case management [45].

Collectively, BCBS plans provide health care coverage for people in the 50 states, the District of Columbia, and Puerto Rico. This represents 27 percent of the U.S. population. BCBS operates the nation's largest new medical technology evaluation program, known as the Technology Evaluation Center (TEC). TEC recently won an unprecedented contract to provide technology assessments for the Civilian

7. Quality Point of Service Program covers medical expenses whether a member visits an Aetna US Healthcare participating provider or an out-of-network doctor or hospital.

Health and Medical Program of the Uniformed Services (CHAMPUS), making TEC the primary technology assessment resource for both the public and private sectors [46].

Allina Health System (AHS)

Allina's practice ostensibly operates an integrated model. AHS is a not-for-profit integrated health system. It covers approximately 1 million people in Minnesota, western Wisconsin, eastern North Dakota, and South Dakota. It has designed its mental health services delivery to complement its three regions. The integration model is site based and includes multiple specialties. A full-time Ph.D. psychologist is hired by the PCPs in the clinics of one region. In another region, doctoral and master level therapists are hired to work in the clinics [47].

Foundation Health Systems, Inc.

The company provides managed health care and other medical coverage to more than 5 million members residing in Arizona, California, Florida, and select states of the Northeast. Through its subsidiaries, Foundation Health Systems offers HMOs, PPOs, and Medicare HMOs, along with behavioral health, dental, vision, and prescription benefit management plans. The company also provides health care coverage for military and other government personnel and their dependents through TRICARE contracts [48]. Foundation Health Systems follows an autonomous delivery model.

Choicehealth

The Primary Care Physician Direct Referral Program develops relationships between primary care practices and behavioral health providers by permitting physicians the option to bypass ChoiceHealth and make direct referrals to ChoiceHealth's contracted group practice. ChoiceHealth includes behavioral health practices in its network that had referral relationships with primary care clinicians [49]. Choicehealth follows an autonomous delivery model.

Summary of health insurance plans

Because “integration” is more ambiguous than the other two types of designs and is still being explored by health insurance companies, there were more examples representing integrated programs selected for this section. In reality, most health insurance plans have autonomous, and even fewer have collaborative, functional designs. Statistically significant results are not yet available, but some positive preliminary results show [14]:

- A decrease in depressive and anxiety symptoms as measured by the ZUNG scales of severity
- High levels of patient satisfaction with care
- Increased numbers of the diabetic population being treated for depression
- Quality promoted and improved
- Increase in efficiency of care
- Reduction in costs and length of in-hospital stay.

The integration programs are still in the pioneering stage, and few data have been gathered on program effectiveness. However, initial internal evaluations indicate promising results. Over the next few years, after the programs have had time to mature, more comprehensive evaluations will be undertaken to empirically document results.

Community and other programs

This section details several dynamic programs that serve to integrate mental health care in the community and with other advocacy groups. These programs are Integrated Healthcare Partners [50], Assertive Community Treatment [51, 52, 53, 54] and various religious-based community support programs [55].

Integrated Healthcare Partners (IHP)/KPS

Kitsap Physician Services has over 80,000 members in the Kitsap and Olympic peninsulas of the western region of Washington State. PHS

hired Integrated Healthcare Partners to implement and evaluate a turnkey managed behavioral health program. Their guiding principle was to deliver innovative, community-based services that integrated MHSA services with medical care [50]. Stated program goals included improving access to care, increasing the quality of care, and improving on the communication of behavioral health clinical outcomes to PCPs and specialty physicians. To integrate services, they employed three clinicians to serve as Clinical Case Managers (CCM): a Ph.D. specialist in substance abuse treatment, a staff nurse from the local inpatient psychiatric unit, and a licensed social worker. First-year program results include a 50-percent increase in patient access, a decrease in the average length of stay (ALOS) as well as a decrease in the number of bed days per 1,000 and rates of recidivism, and an increase in observed patient satisfaction levels. In addition, KPS also saved nearly \$20,000 in medical claims in the program's first year of operation.

Assertive Community Treatment (ACT)

The council for the Accreditation of Rehabilitation Facilities (CARF) defines ACT as a multidisciplinary team approach that assumes responsibility for directly providing acute, active, and ongoing community-based psychiatric treatment, assertive outreach, rehabilitation, and support [22]. Assertive Community Treatment (ACT), Program for Assertive Community Treatment (PACT), Training in Community Living (TCL), and Mobile Treatment are synonymous. These programs provide psychosocial services directed primarily to adults with severe and persistent mental illness, who often have co-occurring problems, such as substance abuse, homelessness, and involvement with the judicial system. These organizations play an increasing role in supporting mental health and chemical dependency service delivery. A program of Assertive Community Treatment is a self-contained clinical team that:

- Assumes responsibility for directly providing needed treatment, rehabilitation, and support services to identified clients with severe and persistent mental illnesses
- Minimally refers clients to outside service providers

- Provides services on a long-term care basis with continuity of caregivers over time
- Delivers 75 percent or more of the services outside program offices
- Emphasizes outreach, relationship building, and individualization of services.

The clients to be served are individuals who have severe symptoms not effectively remedied by available treatments or who, because of reasons related to their mental illnesses, avoid involvement with mental health services. The team leader, program psychiatrist, program assistant, and multidisciplinary staff are to ensure service quality and helpful and respectful services to program clients [22]. Because ACT is a widely recognized and respected model, state after state is adopting this community approach [52].

Organizing mental health delivery services following ACT principles has been found to be a cost-effective approach to behavioral health care by the Department of Health and Human Services, SAMHSA, and the CMHS [53]. For example, the Wisconsin ACT program has shown that patients were significantly more satisfied with their care after implementation [51]. The Wisconsin group also had fewer psychiatric hospital days, overall greater symptom improvement, and demonstrated that patients were unemployed for shorter durations and earned higher salaries through competitive employment. Lastly, they indicated enhanced levels of functioning.

Religious institutions

Recent research [55] shows that there is support for collaboration between mental health organizations and religious institutions in delivering effective mental health care. Religious groups provide support to achieve expanded services, facilitate discharge, assist in client normalization, decrease stigmatization, build social support networks, conduct preventive intervention, and reduce fear. A program in Minnesota showed numerous interactions with Lutheran churches. New Jersey's "social club" meets weekly and provides support to members who received clinical treatment. This partnership between the congregation's rabbi or minister and mental health com-

munity services aimed to increase empowerment and fulfillment. The Congregational Support Program in Missouri provides handouts giving directions for planning a program. Although there are few examples demonstrating the collaboration between mental health and religious institutions, these models of partnerships are auspicious and show potential for collaboration with clergy.

Summary of community and other programs

These programs indicated that involvement with the community makes significant impact. The IPS and ACT approach is to provide care from a team level perspective with the inclusion of a psychiatrist on the team. The types of care and guiding principles of the ACT model are mobility, assertiveness, and continuity. The ACT model, although popular, is not accepted by all clients, particularly the severely mentally ill patients [52]. There are positive results, however, including reduction of symptoms, patient satisfaction, and functioning [51, 56], that make it worthwhile to imitate these community-based programs. Lastly, partnerships with religious institutions in the civilian sector show the importance and impact of the clergy. The Navy's chaplains currently play an instrumental role in their assistance in mental health care.

Models of educational linkages

Overview

This section will focus on the education of practitioners, although the education of patients and families is also important for improved behavioral healthcare.

Models of interaction between psychiatrists and primary care in the outpatient setting originated in Great Britain and were termed "attachment-liaison." In the U.S. the interaction is known as "consultation-liaison." According to Schuyler and Kimberly [28], the ultimate liaison is to have a mental health specialist in the primary care setting. One major result is mutual education and learning among providers. It is not surprising that Great Britain has been a leader in establishing practitioner educational models that link primary care and mental health. There is not a plethora of educational models in the published literature, but we have identified some valuable examples. We highlight salient aspects of 12 educational/training programs: 3 from Great Britain, 8 in the United States, and 1 in the Netherlands. Results of the evaluations of the educational programs for each study are cited if available.

Examples of educational/training programs

Great Britain

Ratcliffe et al. [29] recently published their study on psychiatric training of family doctors. They reviewed a training course designed to train family doctors in the recognition and management of common problems in primary care. The 8-day course consisted of workshops facilitated by psychiatrists and general practitioners. Teaching tools included lectures, demonstrations, videotape demonstrations, small group work, case presentations, and role-play. Results showed that

there was improvement in communication skills, and the ability for PCPs to access resources and detect psychiatric illness. The course was also able to fulfill physicians' needs to attain skills in management of somatization, detection of illness, and management of suicidal ideation [28]. However, the course did not succeed in improving physicians' treatment for substance abuse and management of aggression. Two other studies in Great Britain showed improvement in managing depression [57] and managing somatic presentations of psychiatric illness [58] after use of a training package (instructional videotape).

United States

Francis Kane, Chief of Psychiatry in Overton Brooks Medical Center, conducted a survey of university-affiliated internal medicine programs to understand the nature of their training in psychiatry. He found that only 10 percent of the residents were offered any kind of curriculum in psychiatric education. Kane stressed the obvious need for psychiatric training for primary care providers [59].

A study by Lin et al. [39] was conducted to examine the effectiveness of an educational program that trained 22 PCPs in selected clinics (of Group Health Cooperative of Puget Sound) for 1 year. This program included didactics, role-play, review of patient education pamphlets, videotape instruction, and use of reference handbooks. The PCPs were required to educate patients, continue adequate dosage for 6 months, monitor patients, and avoid medication with lower adherence and higher side effects. The results of the educational program were positive, indicating better therapeutic practices (thus better compliance to antidepressant therapy), enhanced clinical outcomes, and higher patient satisfaction. More than 80 percent of PCPs felt increased satisfaction with treating depression. But researchers were not able to isolate the positive results due to education because of simultaneous service reorganization (i.e., surveillance of adherence, co-management, patient education). They conclude that education alone is not sufficient to cause improvements and that the restructuring of services was essential.

Cohan et al. [60] from the University Medical Center at Stony Brook and Department of Veterans Affairs in New York formed a primary

care track that introduced a psychosocial curriculum to first-year primary care residents, who met twice weekly. Their aim was to build a solid knowledge base in basic psychosocial clinical skills, develop residents' confidence levels, and train residents to be instructors. The syllabus was designed by primary care physicians, preventive medicine physicians, psychologists and social workers. Similar to the study of Ratcliffe et al. [29], teaching tools included role-play, videotape feedback, interactive approaches to improve skills on patient interviewing and counseling. There were mini-lectures, seminars, small group problem-based sessions, and presentations for peer education. Education was self-directed learning to address diagnosis, treatment, substance abuse, chronic pain, difficult patients, medical ethics, and decision-making. There was a continuity phase for additional teaching at noon conferences, grand rounds, and clinic conferences where there were video presentations of provider-patient interaction as well as patient presentations. The favorable results indicated that residents' skills were improved and lessons were integrated into their practice.

A similar curriculum was established in the primary care residency program at the University of Kentucky in 1994. Residents were placed in small group seminars to role-play and participate in interactive discussions. The syllabus included core psychiatry management concepts tailored to common psychosocial/psychiatric problems. Didactic lessons on diagnosis were given during resident's education series and weekly clinic conferences. Each resident attended a weekly psychiatric consult clinic while on ambulatory rotation [61].

Netherlands

A pretest-posttest study on the effects of provider training was conducted in ten primary care practices in The Netherlands. Primary care physicians' knowledge about and treatment of depression improved after an implementation of a hands-on learning training program, according to Van Os et al. [62]. There were eight training sessions of 2.5 hours each, with three targeting depression. Courses were taught by psychiatrists and PCPs. The training program included using screening instruments, symptom diagrams based on ICD-10 criteria, specific treatment guidelines, medication protocols,

training materials, and clinical management principles. Tools for providing education were similar to those mentioned in other studies. The recognition of mental health problems and accurate diagnosis of depression improved after the educational intervention, however researchers could not report statistically significant results.

Other educational models (medical school, psychiatry program, and nursing)

Medical school education

At the University of Florida College of Medicine, community-based psychiatry was introduced as a 7-week clerkship for third-year medical students and as an elective for seniors [63].

Students received presentations on crisis intervention, dual diagnosis, chronic mental illness, and the homeless mentally ill. The training included a crisis-stabilization unit, an intensive psychiatric community care (IPCC) team, and Helping Hands Clinic for the homeless (HHC). Results of this initiative were not provided.

Psychiatry program

James Shore proposed an elective curricular model for primary care training in general psychiatry programs. A psychiatric first postgraduate year requires 4 months in internal medicine, family practice, and/or pediatrics and the training must be in a clinical setting providing comprehensive and continuous patient care. He described new opportunities for dual or triple board certification in development: the combined adult and child psychiatry with primary care pediatrics, family practice, general internal medicine, and neurology. The American Board of Psychiatry and Neurology approved separate guidelines for combined residency training between psychiatry and family practice, internal medicine and neurology. The primary care psychiatrist would be a general physician and psychiatrist, treating medical disorders and the psychiatric illnesses [64].

Cowley et al. contend that psychiatry residents can be trained in specific skills to serve as consultants in the primary care setting [65].

They examined a primary care consultation-liaison 2-year rotation experience for 4th year psychiatry residents. An attending psychiatrist supervised the residents in training. The evaluation of residents' experiences in the training program revealed positive results. Cowley et al. recommended that similar rotations be initiated in other primary care settings.

Nurse education model

Wendy Couchman discussed a Project 2000 nurse education model aimed at multidisciplinary training to include nurses and social workers. Also, primary health care education for nurses would continue in tandem with general practitioner and other professional training. Psychiatric nurses have studied with colleagues from other professions on postgraduate and master's courses of interdisciplinary interest [66]. Mental health in primary and secondary care was common among different nursing disciplines. Thus, she advocated interdisciplinary nursing training to address behavioral healthcare treatment.

Summary

The educational models presented here aim to instruct providers at all levels and venues: primary care settings, nursing, psychiatry, and medical schools. The need to be trained and retrained to keep up with the rapid pace of improvements in behavioral health treatment require multidisciplinary training, teamwork, and co-education at the co-location level.

How does the Navy compare to current practices?

TRICARE is DOD's regional managed care program for delivering health care to members of the Armed Services and their families, survivors, and retired members and their families. TRICARE includes two general sources of care. The first is the military services' direct care system, comprising each branch's respective military treatment facilities. The second is the regional managed care support contracts, which supplement the direct care system with civilian providers. The Navy can control and direct the course of its direct health care facilities much more easily than it can influence the course of the managed care support contracts that are negotiated at the DOD level and fall under the domain of the Assistant Secretary of Defense (Health Affairs) and the TRICARE Management Agency. Thus, the Navy is part of a health care program that combines a contractual model over which it has little influence with a functional model applied in its own facilities that essentially produces its version of a "de facto mental and addictive disorders service system" [67].

Currently, the TRICARE regional managed care support contracts represent adaptations of integrated models that, in turn, contract with a separate entity to provide oversight, management, and coordination of mental/behavioral services (carve-outs). Within the Navy's military treatment facilities, it essentially operates an independent clinical approach similar to the private employers profiled in this paper. Recent research finds that most regions report little integration between mental health and primary care, and behavioral health services are carved-out [68]. There is also a perceived problem of unevenly distributed mental health specialists among the facilities. The gap between mental health and primary care is widened by a benefit that gives beneficiaries the option of eight self-referral visits to a civilian provider. Increasing numbers of specialty referrals to civilian networks are causing concern [68]. This may be partly the result of

the issues of social stigma and confidentiality in the military culture. Yet despite perceived barriers, Navy providers and program managers tend to agree that "a combined approach to mental and physical treatment is a goal" [68].

Currently, DOD is conducting a demonstration program in the Central Region to test a wraparound delivery system that integrates case management techniques with community and family resources (child and adolescent mental health services). The program's aim is to attain shorter inpatient days, reduce recidivism, and reduce costs. The results of the demonstration project are currently under evaluation. In summary, minimal collaboration, loose referral system, lack of resources, and stigma are barriers to functional (clinical) integration in the Navy, which mirrors most of the activity in the private sector (apart from our examples).

Planning issues

Contractual considerations

The debate of whether to carve out or to integrate mental health with primary care is a result of the increasing prevalence of mental health diagnoses in the population, inhibited access to care, dual and proper diagnosis, and appropriate treatment. Clinicians and public health officials tend to believe that integration promotes better access and greater continuity of care for patients. On the other hand, advocates and specialty providers counter that the complex and uncertain nature of diagnosis and treatment of behavioral health disorders requires specialized expertise and resources. DOD is currently carving out behavioral health services under the regional managed care support contracts without a comprehensive understanding of the potential to expand the capacity of their direct care resources. Currently the Navy has no control over the specifics of the regional managed care support contracts. The Defense Medical Oversight Committee is reviewing potential changes to DOD's contract approach and is considering the use of an integrated delivery model within the catchment area and the administrative-services-only (ASO) model outside the catchment area. This may give the Navy more influence over the regional contracts in the two regions in which it serves as the Lead Agent (Region 2, Tidewater Virginia/North Carolina, and Region 9, Southern California). Even if this contractual arrangement is resolved, they still must reconcile the issue of integration of services in the clinical setting.

Functional considerations

Currently, the Navy's primary care providers and mental health specialists work autonomously, with little communication. The first step in clinical integration is for them to ask: "For what population, with what clinical condition, and at which step in the clinical process is

care to be integrated?" [36]. Tools used to integrate services have been developed to address the barriers of organizational boundaries and the struggle over power and control [69, 70]. Hoge and Howenstine [70] emphasize the importance of informal networks as effective ways to achieve integration. Service integration is successful because of informal networks and not formal structures leading to cooperation and productivity. These tools, described in [69], are:

1. *Creating an umbrella organization*—most basic strategy of merging
2. *Creating integrative task groups*—increases communication and team work
3. *Participatory management*—leadership and power sharing approach
4. *Strategic planning*—planning and feedback process involving all stakeholders
5. *Boundary spanners*—representative, liaison of several agencies crossing boundaries
6. *Team building*—multispecialty approach to problem solving
7. *Resource sharing*—share information, directories, fosters shared goals and values
8. *Multiple-agency programming*—combining resources for implementation.

The Navy has already begun this process by developing an "integrative task group" (item 2) for the mental health product line.

The key ingredients for mental health general health collaboration are the relationship, a common purpose, a paradigm, strong communication, location of service, and business arrangement [26]. The primary care clinician's role [3] includes identifying patients' symptoms, educating patients, managing mental disorders, monitoring the outcomes, and preventing mental disorders. Guidelines to identify, evaluate, diagnose, and manage primary care patients were developed by the Agency for Healthcare Quality and Research (AHQR). This and other resources, such as the PRIME-MD diagnosis system, and

Clinical Evaluation Guide (CEG), working in conjunction with DSM-IV guidelines, are tools [3] the Navy should use to plan an appropriate integration.

The Navy needs to ensure that its mental health services use coordinated, managed behavioral health techniques, including the following:

- Adequate provider networks⁸
- Mechanisms for referral and treatment,⁹ such as referral units, and case managers that provide for 24-hour, 7-day/week access to treatment
- Availability of a continuum of treatment services and settings, including inpatient, outpatient, partial hospitalization, halfway houses, wraparound services, intensive day treatment, and other comparable settings
- Pre-certification of treatment for appropriateness of fit between patient and provider (provided such pre-certification does not become a barrier to timely access to needed treatment), including internal entities with responsibility for care oversight to see that employee needs are being met
- Discharge coordination and planning to ensure that inpatient treatment is followed by appropriate outpatient care.

8. Benefits offered by carriers should provide for networks with systems for coordination of mental health and substance abuse benefits for members with co-occurring disorders, appropriate screening, diagnosis and referral for treatment by primary care providers, and coordination between primary care physicians and behavioral health care providers and networks. However, there should not be barriers to accessing treatment, nor should there be a continuation of arbitrary day or lifetime limits on substance abuse treatment [3].

9. Treatment planning to address addiction that ensures provision and use of aftercare services could include making use of "contracting" for outpatient aftercare or similar mechanisms to prevent repeated episodes of short-term inpatient detoxification without follow-up care in outpatient programs [3].

In addition, the Navy needs to examine specific goals for programming. We provide a guiding list of goals matched with activities that serve to support the primary care physician in delivering mental health care in table 7.

Table 7. Goals and characteristics of primary mental health care delivery

Goals	Service delivery
Improve clinical outcomes through enhanced detection, treatment, and followup strategies used by primary care providers.	Uses limited brief consultation visits to build on existing interventions and to suggest new ones; primary health care provider is "in charge" of the patient's care.
Manage at-risk patients to prevent the onset or recurrence of a mental disorder.	"See all comers" service philosophy encourages a broad-spectrum referral pattern, and utilizes the physician-patient relationship to detect at-risk situations, such as life stresses and transitions.
Educate primary care providers in the use of appropriate medication and psychosocial treatments.	Primary product of consultation is the consultation report and face-to-face feedback; consultation strategies are tailored to the "15-minute hour."
Manage high-utilizing patients with chronic health and behavioral health concerns to reduce inappropriate medical utilization and to promote better functional outcomes.	Longer-term consultative followup is reserved for the small number of patients with numerous medical and/or psychosocial concerns; consultative co-management over time.
Deliver integrated programs of care for high-frequency mental and addictive disorders (e.g., depression, anxiety, alcohol abuse, psychosocial stresses).	Service has "pathway-driven" consultative intervention programs, which use a temporary co-management model to manage and resolve a particular condition within the context of primary care services.
Accurately identify and place patients who require specialized mental health treatment.	Service is organized to triage patients to specialty care and to function as a liaison between the specialty provider and the health care provider.
Address the behavioral health needs of the entire primary care population.	Service is provided in a population-based care framework, using both horizontal and vertical service delivery methods.
Deliver service in a way that is consistent with the goals and mission of primary care.	Consultant is part of the "primary care team"; health care provider is the primary customer of consultative services.
Deliver service in a manner that is "acceptable" to all consumers of health services.	Service functions as part of primary care, located in same practice area, used as an ancillary element of routine medical visits.

Source: [33]

Noteworthy is the third goal; *Educate primary care providers in the use of appropriate medication and psychosocial treatments*, where PCPs play an instrumental role in treatment, particularly in cases of less than severe mental illness. Another goal, *Deliver service in a way that is consistent with the goals and mission of primary care*, suggests that a consultant is part of the "primary care team." Other goals offer a structural service delivery model of co-management.

The issues pertaining to planning a behavioral health integration initiative must be committed to beginning with aggressive leadership, if the health of Navy beneficiaries is to be improved and expanded. The key issues and tools outlined here have already been formulated and developed to facilitate the planning and implementation process. Once a goal is agreed upon, the next step is to build a plan.

Conclusion

Employers tend to carve out their mental health benefits because they believe in (a) realizing economies of mass purchasing, (b) receiving better utilization data to manage costs, and (c) eliminating the “middle man” because plans are likely to subcontract with a vendor with whom they can contract directly. All of these have financial considerations. However, other leaders and policy-makers find that integrating mental health and general services increases access and in the long run reduces utilization and costs. The National Institute of Drug Abuse has pointed to extensive research showing that parallel or sequential treatment is not as effective as alternative models, such as clinical integration [71]. For purchasers, integrated care is appealing: higher medical costs for patients with untreated health problems, offset costs of ineffective medical treatment by providing behavioral health services, decreased morbidity in patients when behavioral health and physical health are both met, and empowerment for patients to be proactive in their health care. For consumers, integrated care means more successful treatment and better clinical results. The advantages of having a mental health specialist on the primary medical care team are [65]:

- Time and travel costs savings to patients
- Less stigma when patients are not referred out
- Instant feedback and communication to manage decisions
- Providers can get to know each other and share knowledge
- Unlimited opportunity for the PCP and mental health specialist to educate each other
- Unlimited opportunity to teach students as they observe the medical-psychiatric collaboration (role models)

- Differing time requirements can be accommodated by PCP (brief and high volume visits) and mental health specialist (longer visits and more patients)
- Continuity of care for patients.

The evidence from the civilian sector shows:

- Although the use of carve-outs has proved effective in containing costs and shifting mental health utilization from the inpatient to outpatient arena, evidence in the literature suggests that integration of services is more effective. The National Alliance for Mental Health, among others, endorses integrated rather than sequential or collaborative-parallel service approach.
- In current practice, approximately an equal number of programs either carve out or contractually integrate mental health delivery. Integrating is the emerging trend.
- Most health systems function under either an autonomous or a collaborative (clinical) model.
- The stigma attached to mental illness, the lack of parity between health and mental health benefits, and the current realities of medical practice all present obstacles to integration. Despite this, current models and preliminary results of pilot programs have demonstrated positive results. They are leading the path to integrate behavioral health care, both administratively and clinically.

Planning for integration is incomplete without committing to general and mental health linkage at the clinical level. Surgeon General David Satcher's recent report, which focused on improving mental health care, has been widely distributed as it reflects the urgent need for change and top priority of the Department of Health and Human Services [1]. One of the themes is that primary care practitioners are a "critical link in addressing mental disorders." We recommend that Navy Medicine develop and implement a pilot program that clinically integrates mental health with primary care in various facilities to determine the extent to which integration can help the Navy optimize the provision of its mental health services.

Appendix A: State use of contractual models

Table 8 indicates the contractual arrangements used by each state for their public mental health programs in 1999. Note that some states have more than one program and approach. Overall, there are 35 carve-out programs, 41 integrated programs, and 9 programs in which the state currently chooses to operate traditional fee-for-service programs rather than rely on some form of behavioral health managed care.

Table 8. Mental health contractual linkage by state, 1999

State	Full carve-out	Partial carve-out	Integrated	Carve-in	Not managed care
Alabama			x		
Alaska					x
Arizona	x		x (2)		
Arkansas	x				
California	x (2)		x (2)		
Colorado	x (2)				
Connecticut	x		x		
Delaware		x			
Florida	x				
Georgia	x				
Hawaii		x			
Idaho	x				
Illinois			x		
Indiana	x (2)		x		
Iowa	x				
Kansas					x
Kentucky	x		x		
Louisiana					x
Maine					x
Maryland	x		x		
Massachusetts			x		

Table 8. Mental health contractual linkage by state, 1999 (continued)

State	Full carve-out	Partial carve-out	Integrated	Carve-in	Not managed care
Michigan	x		x (2)		
Minnesota	x		x (4)		
Mississippi					x
Missouri	x		x		
Montana					x
Nebraska	x (2)				
Nevada			x		
New Hampshire	x		x		
New Jersey					x
New Mexico				x	
New York	x (2)	x	x (2)		
North Carolina					x
North Dakota			x		
Ohio	x		x		
Oklahoma			x		
Oregon	x		x		
Pennsylvania	x		x		
Rhode Island			x		
South Carolina	x		x		
South Dakota			x		
Tennessee	x				
Texas	x		x		
Utah	x				
Vermont	x		x		
Virginia			x (3)		
Washington	x		x		
West Virginia	x				
Wisconsin	x (2)		x (5)		
Wyoming					x
Total	35	3	41	1	9

Source: [55]

Appendix B: State use of managed care organizations

Table 9. Types of managed care organizations, 1999

State	Public	Private	Partnership	Not managed care
Alabama		x		
Alaska				x
Arizona	x (2)	x (2)		
Arkansas			x	
California	x (4)	x		
Colorado	x (2)	x (2)	x (2)	
Connecticut		x (2)		
Delaware		x	x	
Florida		x	x	
Georgia		x		
Hawaii		x		
Idaho		x		
Illinois		x	x	
Indianapolis	x	x (3)		
Iowa		x		
Kansas				x
Kentucky			x (2)	
Louisiana				x
Maine				x
Maryland	x	x (2)		
Massachusetts		x		
Michigan	x (3)	x		
Minnesota	x	x (4)		
Mississippi				x
Missouri	x	x		
Montana				x
Nebraska		x (2)		
Nevada		x		

Table 9. Types of managed care organizations, 1999

State	Public	Private	Partnership	Not managed care
New Hampshire	x	x		
New Jersey				x
New Mexico		x		
New York	x (3)			
North Carolina				x
North Dakota		x		
Ohio		x (2)		
Oklahoma		x		
Oregon	x (2)	x		
Pennsylvania	x	x (2)	x	
Rhode Island		x		
South Carolina	x	x		
South Dakota		x		
Tennessee		x		
Texas		x (2)		
Utah	x			
Vermont	x	x (2)	x	
Virginia	x	3		
Washington	x	x		
West Virginia	x	x		
Wisconsin	x (2)	x (2)	x (3)	
Wyoming				x
Total	30	54	13	9

Source: [55]

References

- [1] U.S. Department of Health and Human Services. *Mental Health: A Report of the Surgeon General*, 1999 (Department of Health and Human Services, Substance Abuse and Mental Health Services Administration, Center for Mental Health Services, National Institutes of Health, National Institutes of Mental Health, Rockville, MD)
- [2] Lisa V. Rubenstein et al. "Evidence-Based Care for Depression in Managed Primary Care Practices; A Collaborative Approach Shows Promise in Improving Care of Depression in a Variety of Sites." *Health Affairs*, Sep-Oct 1999
- [3] Davis Brody. "What Is the Role of the Primary Physician in Managed Mental Health Care?" In Arthur Lazarus (ed.), *Controversies in Managed Mental Health Care*. Washington, DC: American Psychiatric Press, Inc., 1996
- [4] M. L. Durham. "Commentary: Can HMOs Manage the Mental Health Benefit?" *Health Affairs*, Fall 1995
- [5] H. C. Schulberg, M. R. Block, and J. L. Coulehan. "Treating Depression in Primary Care Practice: An Application of Decision Analysis." *General Hospital Psychiatry*, 1989, Vol. 11:208-215
- [6] Charles Engel, MAJ, Kurt Kroenke, LTC, and Wayne Katon. "Mental Health Services in Army Primary Care: The Need for a Collaborative Health Care Agenda." *Military Medicine*, Mar 1994, Vol. 159:203-209
- [7] A. Doris, E. Klaus, and S. Polash. "Depressive Illness." *Lancet*, 1999, 354(9187):1369-1375
- [8] H. C. Schulberg et al. "Treating Major Depression in Primary Care Practice: An Update of the Agency for Health Care

- Policy and Research Practice Guidelines." *Archives of General Psychiatry*, 1998, Vol. 55(12):1121-1127
- [9] Philip Boyle and Daniel Callahan. "Managed Care in Mental Health: The Ethical Issues," *Health Affairs*, Fall 1995,14:3
 - [10] W. E. Welton, T. A. Kantner, and S. M. Katz. "Developing Tomorrow's Integrated Community Health Systems: A Leadership Challenge for Public Health and Primary Care." *Milbank Quarterly* 1997, 75(2):261-288
 - [11] M. S. Klinkman and I. Okkes. "Mental Health Problems in Primary Care: A Research Agenda." *Journal of Family Practice*, 1998, 47(5):370-384
 - [12] G. Simon and M. Von Korff. "Is the Integration of Behavioral Health Into Primary Care Worth the Effort? A Review of the Evidence." In Nicholas Cummings et al. (eds.), *Behavioral Health in Primary Care*. Madison, CT: Psychosocial Press, 1997
 - [13] Gregory Simon and Edward Walker. "The Consultation-Liaison Psychiatrist in the Primary Care Clinic." *Textbook of Consultation-Liaison Psychiatry*. Washington, DC: American Psychiatric Press, 1996
 - [14] Robin Dea et al. "Systems Challenge: Integrating Behavioral Health Care into the Primary Care Setting." *Permanente Journal*, 1998, Vol. 2, No. 3, Summer
 - [15] Robin Dea. "The Integration of Primary Care and Behavioral Health Care in Northern California Kaiser-Permanente." *Psychiatric Quarterly*, 71(1):17-29, Spring 2000
 - [16] Paul G. Wilson, Ph.D., Maj, USAF, BSC. *The Tinker Project—Integrating Behavioral Health Providers Into Primary Care* (draft final report), Aug 16, 2000 (Office for Prevention and Health Services Assessment (OPHSA) AFMOA/SGOH, Brooks AFB, TX)
 - [17] Personal communication with Sandra Cooper, The Centre for Evidence-Based Mental Health, Department of Psychiatry,

University of Oxford, Warneford Hospital, Oxford, OX3 7JX,
United Kingdom

- [18] Personal communication with Harry (Chip) Taylor, M.D., CDR, MC (SWMDO), USN, at BUMED on systematic searching algorithm
- [19] Personal communication with Susan Bidwell at NZHTA (susan.bidwell@chmeds.ac.nz) on her literature search on the effectiveness of primary mental health compared to secondary services in New Zealand and overseas
- [20] H. A. Pincus. "Linking General Health and Mental Health Systems of Care: Conceptual Models of Implementation." *American Journal of Psychiatry*, 1980, 3:315-320
- [21] H. C. Schulberg, K. Magruder, and Frank deGruy. "Major Depression in Primary Medical Care Practice: Research Trends and Future Priorities." *General Hospital Psychiatry*, 1996, 18:395-406
- [22] Gail T. Bergman et al. *State Profiles, 1999, on Public Sector Managed Behavioral Healthcare*, May 2000 (Substance Abuse and Mental Health Services Administration (SAMHSA), U.S. Department of Health and Human Services, DHHS Publication No. (SMA)00-3432)
- [23] J. Gonzales and G. Norquist. "Mental Health Consultation-Liaison Interventions in Primary Care." In Jeanne Miranda (ed.), *Mental Disorders in Primary Care*. San Francisco: Jossey-Bass, 1994
- [24] Frazier Shervett. "Research on Mental Health Liaison in Primary Care Settings." *General Hospital Psychiatry*, 1987, 9:94-101
- [25] Collette Croze. *Integration: How Do We Make It Work?* Aug 1999 (SAMHSA Managed Care Tracking Report, DHHS Publication No. (SMA) 99-3347, Vol. II, No. 2)

- [26] A. D. Lorenz, L. B. Mauksch, and B. A. Gawinski. "Models of Collaboration." *Primary Care-Mental Health*, Jun 1999, 26(2):401-410
- [27] Monica Oss and Mark Tidgewell. "What Factors Should Managed Behavioral Health Programs Consider When Designing Their Operations?" In Arthur Lazarus (ed.), *Controversies in Managed Mental Health Care*. Washington, DC: American Psychiatric Press, Inc., 1996
- [28] Dean Schuyler and Kimberly Davis. "Primary Care and Psychiatry: Anticipating an Interfaith Marriage." *Academic Medicine*, Vol. 24, No. 1, Jan 1999
- [29] Joy Ratcliffe et al. "Psychiatric Training for Family Doctors: What Do GP Registrars Want and Can a Brief Course Provide This?" *Medical Education*, 33:434-438, 1999
- [30] National Conference of State Legislatures. "Health Chairs Project: Managed Behavioral Health Care Carve-outs—Carve-out Controversy" (www.ncsl.org/healthforum/chairs/carve-out.htm)
- [31] Larry Levitt et al. *Employer Health Benefits 1999 Annual Survey*. The Kaiser Family Foundation, Menlo Park, CA, and the Health Research and Educational Trust, Chicago, IL, 1999
- [32] Larry Levitt et al. *Employer Health Benefits 2000 Annual Survey*. The Kaiser Family Foundation, Menlo Park, CA, and the Health Research and Educational Trust, Chicago, IL, 2000
- [33] Kirk Strosahl. "Integrating Behavioral Health and Primary Care Services: The Primary Mental Health Care Model." In Alexander Blount (ed.), *Integrated Primary Care*. New York: W. W. Norton & Company, 1998
- [34] G. McDermott and L. Reid. "Model for Integrated Mental Health Care Measures Up." *Nurse Times*, Mar 31-Apr 6, 1999, 95(13):46-47

- [35] Jeffrey A. Buck and Beth Umland. "Covering Mental Health and Substance Abuse Services; Nearly All Large Employers Cover Mental Health/Substance Abuse Services, But Not to the Same Extent as They Cover Other Medical Care." *Health Affairs*, Jul-Aug 1997
- [36] Kristen Apgar. "Large Employer Experiences and Best Practices in Design, Administration, and Evaluation of Mental Health and Substance Abuse Benefits—A Look at Parity in Employer-Sponsored Health Benefit Programs." *Washington Business Group on Health*, Mar 2000
- [37] <http://www.kaiserpermanente.org>, Aug 22, 2000, and Sep 4, 2000
- [38] Robin Dea. "The Integration Experience in a Group Model HMO: Northern California Kaiser-Permanente." In Joel D. Haber et al. (eds.), *Primary Care Meets Mental Health: Tools for the 21st Century*. Tiburon, CA: Centralink Publications, 1997
- [39] Elizabeth Lin et al. "Achieving Guidelines for the Treatment of Depression in Primary Care. Is Physician Education Enough?" *Medical Care*, Vol. 35, No. 8, 1997
- [40] Anthony Radcliffe, Dennis Cook, and Pamela Morales. "Integration of Behavioral Health Care and Traditional Medical Care." Center for Mental Health Service Conference, Dec 1997
- [41] <http://www.ghc.org>, Aug 22, 2000, and Sep 4, 2000
- [42] P. Johnson, L. Staubach, and Anna Millar. "High Utilizers of Health Services: The Purchaser Perspective and Experience With the Personal Health Improvement Program (PHIP)." In Joel D. Haber et al. (eds.), *Primary Care Meets Mental Health: Tools for the 21st Century*, Tiburon, CA: Centralink Publications, 1997
- [43] <http://www.aetna.com>, Aug 22, 2000, and Sep 4, 2000
- [44] <http://www.blueshield.com>, Aug 22, 2000, and Sep 4, 2000

- [45] N. Langman-Dorward, Elizabeth Gatti, and D. Duval. "Building Partnerships of Lasting Value in Healthcare: The Blue Cross and Blue Shield/Raytheon Collaboration." In Joel D. Haber et al. (eds.), *Primary Care Meets Mental Health: Tools for the 21st Century*. Tiburon, CA: Centralink Publications, 1997
- [46] <http://www.blueshield.com/know/factssystem.html>, Aug 22, 2000, and Sep 4, 2000
- [47] Michael Trangle. "The Group Practice Model: Allina Health System." In Joel D. Haber et al. (eds.), *Primary Care Meets Mental Health: Tools for the 21st Century*. Tiburon, CA: Centralink Publications, 1997
- [48] <http://www.fhs.com>, Aug 22, 2000, and Sep 4, 2000
- [49] Choicehealth, <http://www.intelihealth.com/ipn/pcn/HN/ind/00198475.htm>. Sep 12, 2000
- [50] Integrated Health Partners Corporation. "Turn-Key Managed Behavioral Health Program." White Paper, www.ihpcorp.com, Woodinville, WA, 1999
- [51] Annelle Primm. "Chapter 16. Assertive Community Treatment." In J. Lazarus and S. Sharfstein (eds.), *New Roles for Psychiatrists in Organized Systems of Care*. Washington, DC: American Psychiatric Press, Inc., 1998
- [52] E. J. Hollingsworth. "Maturing Mental Health Systems: Issues of Politics, Boundaries, and Technology Choice." *New Directions for Mental Health Services*, No. 66, Summer 1995
- [53] Deborah Allness. "The Program of Assertive Community Treatment: The Model and Its Replication." *New Directions for Mental Health Services*, No. 74, Summer 1997
- [54] Deborah Allness and William Knoedler. *Recommended PACT Standards for New Teams*, Mar 31, 1999 (Manual derived from State of Wisconsin Department of Mental Health and Social Services, Division of Community Services, published on website of National Alliance for Mentally Ill)

- [55] J. Walters and B. Neugeboren. "Collaboration Between Mental Health Organizations and Religious Institutions." *Psychiatric Rehabilitation Journal*, Fall 1995 19(2):51-57
- [56] Jeanette Jerrel. "Skill, Symptom, and Satisfaction Changes in Three Service Models for People With Psychiatric Disability." *Psychiatric Rehabilitation Journal*, Spring 1999 22(4):342-348
- [57] S. Kaaya, D. Goldberg, and Linda Gask. "Management of Somatic Presentations of Psychiatric Illness in General Medical Settings: Evaluation of a New Training Course of General Practitioners." *Medical Education*, 26:138-144, 1992
- [58] Linda Gask et al. "Evaluation of a Training Package in the Assessment and Management of Depression in Primary Care." *Medical Education*, 32:190-198, 1998
- [59] Francis Kane, Jr. "Need for Better Psychiatric Training for Primary Care Providers." *Academic Medicine*, Vol. 71, No. 6/Jun 1996
- [60] Gail Cohan, Elaine Hearney, and Douglas Brand. "Psychosocial Curriculum for a Primary Care Residency." *Academic Medicine*, Vol. 71, No. 5/May 1996
- [61] C. Stire et al. "Integrating Prevention Education Into the Medical School Curriculum." *Academic Medicine*, 75:S55-59, 2000
- [62] T. W. Van Os et al. "Training Primary Care Physicians Improves the Management of Depression." *General Hospital Psychiatry*, 21(3):168-176, May-Jun 1999
- [63] Richard Christensen. "Introducing Community Psychiatry to Medical Students." *Academic Medicine*, Vol. 71, No. 6/Jun 1996
- [64] James Shore. "Psychiatry at a Crossroad: Our Role in Primary Care." *American Journal of Psychiatry*, Vol. 153(11), Nov 1996

- [65] Deborah Cowley, Wayne Katon, and Richard Veith. "Training Psychiatry Residents as Consultants in Primary Care Settings." *Academic Psychiatry* 24:124-132, Sep 2000
- [66] Wendy Couchman. "Joint Education for Mental Health Teams." *Nursing Standard*, Vol. 10(7), Nov 8-14, 1995
- [67] Darrel Regier et al. "The De Facto US Mental and Addictive Disorder Service System: Epidemiologic Catchment Area Prospective 1-Year Prevalence Rate of Disorders and Services." *Archives of General Psychiatry*, 1993, 50(2):85-94
- [68] Susan Schutte and Michelle Dolfini-Reed. *TRICARE and Mental Health: Providing the Benefit*, Sep 2000 (CNA Annotated Briefing D0002054.A2)
- [69] G. Norquist and S. Hyman. "Advances in Understanding and Treating Mental Illness: Implications for Policy, Project Hope." *Health Affairs*, Sep/Oct 1999
- [70] M. A. Hoge and R. A. Howenstine. "Organizational Development Strategies for Integrating Mental Health Services." *Community Mental Health Journal*, Jun 1997, 33(3):175-87
- [71] National Institute of Drug Abuse, <http://www.nida.nih.gov>, Sep 10, 2000

List of figures

Figure 1.	Pincus' models of linkage between general health and mental health systems of care	9
Figure 2.	Contractual models of linkage between general and mental health delivery systems from least (a) to most integrated (d)	10
Figure 3.	Functional models of linkage between the primary care physician and MHSA specialist	12
Figure 4.	The number of states with managed care programs, by contract type and approach type, 1999	17
Figure 5.	Types of public managed care organizations for public sector managed behavioral health care programs, 1999	18
Figure 6.	Types of private managed care organizations for public sector managed behavioral health care programs, 1999	19
Figure 7.	Percentage of covered workers in firms that carve out mental health benefits by plan type, 1998-2000	22

List of tables

Table 1.	Risk and payment methods for managed care organizations and providers for state Medicaid and non-Medicaid managed behavioral health programs, 1999	20
Table 2.	Percentages of covered workers in firms that carve out their mental health benefits, by region and firm size, 1999	23
Table 3.	Distinguishing characteristics of integrated and collaborative models	26
Table 4.	Levels of primary mental health care	27
Table 5.	Examples of functional relationship models.	29
Table 6.	Examples of collaboration approaches of functional integration, among selected private health insurance plans	34
Table 7.	Goals and characteristics of primary mental health care delivery	60
Table 8.	Mental health contractual linkage by state, 1999	65
Table 9.	Types of managed care organizations, 1999	67

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